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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/820,713	04/09/2004	Takuya Ito	251424US2	8742
22850	7590	05/05/2006	EXAMINER	
OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT, P.C. 1940 DUKE STREET ALEXANDRIA, VA 22314			PANG, ROGER L	
			ART UNIT	PAPER NUMBER
			3681	

DATE MAILED: 05/05/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/820,713	Applicant(s) ITO, TAKUYA	
	Examiner Roger L. Pang	Art Unit 3681	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 30 March 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-6 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) _____ is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 1-6 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

The following action is in response to the amendment filed for application 10/820,713 on March 20, 2006.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-5 are rejected under 35 U.S.C. 102(e) as being anticipated by Kundermann

‘561. With regard to claim 1, Kundermann teaches a vehicle which includes a hydraulic power transmission device, comprising: a front cover 14 of the hydraulic power transmission device; a first oil chamber 80 and a second oil chamber 82 to and from each of which predetermined hydraulic pressure is provided, and each of which is in the hydraulic power transmission device; a lock-up clutch 56 having a clutch piston 58, the lock-up clutch configured to directly connect an input side and an output side of the hydraulic power transmission device when the lock-up clutch and the front cover are placed in contact with each other according to a hydraulic pressure difference between the first oil chamber and the second oil chamber; a lock-up clutch portion (Fig. 1) which controls engagement force of the lock-up clutch with respect to the front cover by changing pressing force that presses the lock-up clutch to the front cover, the pressing force being changed by changing the hydraulic pressure difference; and a frictional material 60

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disposed at a surface of the clutch piston facing the front cover, wherein the clutch piston is in contact with the front cover due to predetermined pressing force via 86 when the hydraulic pressure difference is substantially zero (Col. 5). With regard to claim 2, Kundermann teaches the vehicle, wherein the predetermined pressing force when the hydraulic pressure difference is substantially zero corresponds to a slip state of the lock-up clutch (Col. 5; depending on input speed). With regard to claim 3, Kundermann teaches the vehicle, wherein the second oil chamber 82 is positioned between the front cover and the lock-up clutch, the first oil chamber 80 is positioned so as to be opposed to the second oil chamber with the lock-up clutch being therebetween, and the hydraulic pressure difference is obtained by subtracting the hydraulic pressure in the second oil chamber from the hydraulic pressure in the first oil chamber (82-80); and the lock-up clutch control portion places the lock-up clutch in contact with the front cover using predetermined pressing force via 86 even when the hydraulic pressure difference is a predetermined negative value (Col. 5, until .5 bar is reached). With regard to claim 4, Kundermann teaches the vehicle, wherein the predetermined pressing force when the hydraulic pressure difference is the predetermined value corresponds to a slip state of the lock-up clutch (Col. 5, not bridge free until .5 bar). With regard to claim 5, Kundermann teaches the vehicle, wherein the second oil chamber 82 is positioned between the front cover and the lock-up clutch, and the first oil chamber 80 is positioned so as to be opposed to the second oil chamber with the lock-up clutch being therebetween; and the lock-up clutch control portion increases the pressing force by increasing a hydraulic pressure that is provided to the first oil chamber 80, and decreasing the pressing force by increasing a hydraulic pressure that is supplied to the second oil chamber 82.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kundermann as applied to claim 1 above, and further in view of Reggiardo and in further view of Jamzadeh. Kundermann teaches the vehicle, wherein the drivetrain comprises of an automatic transmission (Col.4, line 20), but lacks the teaching of specific shift control. Reggiardo teaches a vehicle, wherein a shifting control portion 20 which controls shifting by switching between an engagement state and a disengagement state of a frictional engagement devices in an automatic transmission 22 to which output torque of an engine is input, the shifting control portion placing the automatic transmission in a neutral state (neutral “gear”) when a rotational speed of the engine is equal to or lower than a predetermined rotational speed (Col. 9, lines 25-26) when the vehicle is stopped (Col. 9, line 17). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Kundermann to employ the shift control strategy in view of Reggiardo in order to economize the vehicle’s engine operation and minimize wear on the transmission (Col. 2, lines 36-37). Kundermann also lacks the teaching of causing the frictional engagement to be semi-engaged or to be disengaged when switching to a neutral “gear.” Jamzadeh teaches of an automatic transmission that is switched to neutral “gear” by causing the frictional engagement device to be semi-engaged or to be disengaged (Col. 1). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Jamzadeh to

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employ the neutral control strategy in further view of Jamzadeh in order to simplify the transmission and save on parts.

Response to Arguments

Applicant's arguments with respect to claim 1 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Kaneda has been cited to show a similar hydraulic power transmission device.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a).

Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

FACSIMILE TRANSMISSION

Submission of your response by facsimile transmission is encouraged. The central facsimile number is (571) 273-8300. Recognizing the fact that reducing cycle time in the processing and examination of patent applications will effectively increase a patent's term, it is to your benefit to submit responses by facsimile transmission whenever permissible. Such submission will place the response directly in our examining group's hands and will eliminate Post Office processing and delivery time as well as the PTO's mail room processing and delivery time. For a complete list of correspondence not permitted by facsimile transmission, see MPEP 502.01. In general, most responses and/or amendments not requiring a fee, as well as those requiring a fee but charging such fee to a deposit account, can be submitted by facsimile transmission. Responses requiring a fee which applicant is paying by check should not be submitting by facsimile transmission separately from the check.

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Responses submitted by facsimile transmission should include a Certificate of Transmission (MPEP 512). The following is an example of the format the certification might take:

I hereby certify that this correspondence is being facsimile transmitted to the Patent and Trademark Office (Fax No. (571) 273-8300) on _____ (Date)

Typed or printed name of person signing this certificate:

(Signature)

If your response is submitted by facsimile transmission, you are hereby reminded that the original should be retained as evidence of authenticity (37 CFR 1.4 and MPEP 502.02). Please do not separately mail the original or another copy unless required by the Patent and Trademark Office. Submission of the original response or a follow-up copy of the response after your response has been transmitted by facsimile will only cause further unnecessary delays in the processing of your application; duplicate responses where fees are charged to a deposit account may result in those fees being charged twice.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Roger L. Pang whose telephone number is 571-272-7096. The examiner can normally be reached on 5:30am to 4:00pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Charles Marmor can be reached on 571-272-7095. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Roger L Pang
Primary Examiner
Art Unit 3681

May 3, 2006